

PRE-CALCULUS  
WORKSHEET SEC 4.5

NAME \_\_\_\_\_

GRAPH EACH OF THE FOLLOWING: MAKE SURE TO LABEL BOTH THE X AND Y AXIS.

1)  $y = \sin x + 4$

2)  $y = -3\cos x + 1$

3)  $y = 2 + 2 \cos(x + \pi)$

4)  $y = -2 \cos(x - \pi) - 1$

5)  $y = \cos x + 3$

6)  $y = -\sin(2x - 2\pi) + 2$

7)  $y = \cos 2x + 1$

8)  $y = -2 \sin 2x$

9)  $y = 2 \sin \frac{1}{2}x + 1$

10)  $y = -3 \cos(\frac{1}{4}x + \pi)$

11)  $y = -2 \cos \pi x$

12)  $y = -3 \cos(2x - \pi/2) - 4$